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| APPLICATION NO.   | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|-------------|----------------------|---------------------|------------------|
| 10/775,272  | 02/10/2004  | Roberto Semeia       | KAR 002             | 1277             |
| 39232   | 7590        | 04/12/2006           | EXAMINER            |                  |
| Serafini Associates<br>7660 FAY AVE. STE H378<br>LA JOLLA, CA 92037 |             |                      | HEPPERLE, STEPHEN M |                  |
|   |             |                      | ART UNIT            | PAPER NUMBER     |
|   |             |                      | 3753                |                  |

DATE MAILED: 04/12/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/775,272

Applicant(s)

SEMEIA, ROBERTO

Examiner

Stephen M. Hepperle

Art Unit

3753

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --****Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 28 February 2006.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☐ Claim(s) \_\_\_\_\_ is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☐ Claim(s) \_\_\_\_\_ is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 10 February 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |  |
|---|--|
| <p>1) <input type="checkbox"/> Notice of References Cited (PTO-892)</p> <p>2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)</p> <p>3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br/>Paper No(s)/Mail Date _____.</p> | <p>4) <input type="checkbox"/> Interview Summary (PTO-413)<br/>Paper No(s)/Mail Date. _____.</p> <p>5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)</p> <p>6) <input type="checkbox"/> Other: _____.</p> |
|---|--|

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1, 3, 22 and 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over MacNiel in view of Turney. MacNiel shows a second stage regulator with diaphragm 50 moving lever 116 which moves the valve. Inlet fitting 86 provides connection to a first stage regulator at one end by a flexible hose and a seat 94 for valve 98 at the other end. The valve 20 has a stem of smaller diameter than the seat and is supported on centering tabs 104 at the valve seat end. The valve is biased closed by bias spring 106. The square shape of the other end of the valve stem fit in a square hole in the end of tube 80 to prevent its rotation. Turney shows a spring biased valve (Fig. 3) that has centering tabs 61 that engage slots 33 in tube member 31 (Fig. 2) to prevent rotation. It would have been obvious to replace the square cuts at both ends of the MacNiel valve with a set of centering tabs riding in slots cut into the tubular member as shown by Turney as an equivalent arrangement to center the valve and prevent rotation, and to eliminate the need to cut a square surface on the MacNiel valve stem and to eliminate the need to machine a square hole in the end of the MacNiel tube. Regarding claims 22 and 24, the tabs are all the same length from the axis of the valve, and a single plane extending through the valve axis also extends through two tabs.

Claims 4-21 and 23 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Applicant's arguments with respect to claim 1 have been considered but are moot in view of the new ground(s) of rejection.

Applicant's arguments filed with respect to the 35 USC 103 rejection have been fully considered but they are not persuasive. The argument that MacNiel is not in the prior art is simply not understood.. MacNeil was issued over 30 years ago, and it is a second stage breathing regulator, just like applicant's. Regarding Turney, the examiner is simply using the ribs and grooves of Turney, described by Turney as an arrangement to prevent rotation of the valve, to replace the square cutting described above in MacNiel, which is in MacNiel for the same purpose. The structures are taught as equivalent by the fact that they have the same purpose. It is not necessary to take the entire structure of Turney (including the wall mentioned in the remarks). One of ordinary skill may have taken the Turney rim 41 and transferred it to MacNiel, but it seems simpler and more obvious to simply cut grooves in MacNeil tube 80, as it is the equivalent structure to Turney rim 41 (both guide the valve and provide a spring stop. Regarding the discussion of lateral movement, applicant's new limitations are drawn to **radial** movement, not **lateral** movement. Furthermore, the new language recites "restraining the radial movement", not **preventing** the radial movement. The groove and rib structure provides at least some restraint of radial movement. Finally, applicant's comments on a knob to adjust the spring have no relevance to the applied combination, as it matters only if Turney and MacNiel can be combined with each other, not with applicant's device.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

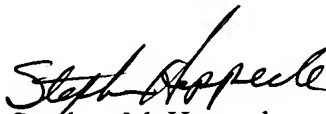
A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Stephen M. Hepperle whose telephone number is 571-272-4913. The examiner can normally be reached on Monday through Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Eric Keasel can be reached on 571-272-4929. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 3753

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
Stephen M. Hepperle  
Primary Examiner  
Art Unit 3753

SMH